

REMARKS/ARGUMENTS

Claims 29, 30, 33-37 and 56-88 are pending in this application. By this amendment, new claim 89 has been added. Support for these claims can be found in the original specification as filed. Claims 56, 59, 60-67, 76-83 and 88 have been amended herewith. Reconsideration of the subject patent application and allowance of the claims are respectfully requested in view of the following remarks.

Claim Objections

Claims 27, 56, 59-63 and 65-67 are objected to because of reasons set forth on pages 2-3 of the Office Action mailed April 4, 2006. In an effort to advance the prosecution of this application, claims 56, 59-63 and 65-67 have been amended and should overcome the objections. Claim 27 has been canceled in a prior Response rendering the rejection moot. Applicants respectfully request that the objections on this basis be withdrawn.

Claim Rejections under 35 U.S.C. §112

Claims 76-83 and 88 are rejected under 35 U.S.C. §112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter. The Examiner argues that claim 76 recites a broad recitation of range and narrower statements of range. In an effort to advance prosecution of this application, claim 76 has been amended by deleting "preferably C₁₃ to C₁₉" and adding a dependent claim to recite this limitation.

Regarding claims 77-81, the Examiner argues that the phrase "said petroleum fraction" lacks antecedent basis. In an effort to advance the prosecution of this application, the claims have been amended to depend from claim 75 rather than claim 74. In claims 82 and 83, "an appropriate device" have been amended to read "an appropriate device selected from the group consisting of rotor-stators, emulsifier apparatuses, static mixers and in-line turbine systems." Finally, in claim 88, the phrase "aqueous phase is dispersed in the hydrocarbon phase" has been deleted and "engine fuel" has been added. Finally, the dependency has been changed to claim 74.

Claim Rejections under 35 U.S.C. §103(a)

Claims 29, 30, 33-36, 56-58, 60-63 and 70-88 are rejected under 35 U.S.C. §103(a) as being unpatentable over Berlowitz et al. (U.S. Patent No. 6,325,833). The Examiner argues that Berlowitz discloses water-emulsion blends comprising a hydrocarbon water ration of 90/10 to 50/50. Berlowitz is also cited for teaching a non-ionic surfactant and emulsions formed by conventional emulsion technology.

Applicants respectfully traverse. The Examiner fails to make a *prima facie* case of obviousness because no evidence has been presented that one of ordinary skill in the art would have been motivated to use the Fischer-Tropsch phase of a hydrocarbon component in Berlowitz to arrive at the claimed invention. The Examiner acknowledges that Berlowitz fails to teach a composition with explicitly 5-35 wt% C₈-C₂₂ normal paraffins. Berlowitz relates to emulsions comprising Fischer-Tropsch derived liquids and hydrocarbon liquids other than Fischer-Tropsch liquids and a surfactant, where the amounts of water / total hydrocarbon can vary from 10/90 to 90/10, with preferably the amount of hydrocarbon being greater than 50% wt.

The hydrocarbon phase of the present invention cannot be a mixture of Fischer-Tropsch and non Fischer-Tropsch hydrocarbon phases. The present invention teaches hydrotreated vegetable or animal oils that are nowhere described in the Berlowitz reference. Nowhere in Berlowitz is there reference to an emulsion comprising 5 to 35% by weight of C₈-C₂₂ normal paraffins. Even if the Fischer-Tropsch hydrocarbons can contain C₅-C₁₇ hydrocarbons, nothing is taught about the used amount. There is no suggestion or motivation in Berlowitz to teach a composition using 5-35 wt% C₈-C₂₂ normal paraffins. Therefore, the Examiner's obviousness rejection is improper. Applicants therefore respectfully request that the rejection on this basis be withdrawn.

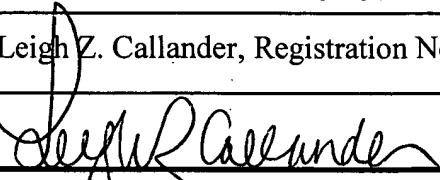
Claims 37, 59, 60 and 64-69 are rejected under 35 U.S.C. §103(a) as being unpatentable over Berlowitz in view of Haupais et al. (U.S. Patent No. 6,068,670). The Examiner argues it would have been obvious to one of ordinary skill in the art to use any of the advantageous

additives taught by Haupais in the water-fuel emulsions of Berlowitz since they are known additives.

Applicants respectfully traverse. The present invention relates to an emulsified fuel containing a hydrocarbon liquid phase, an aqueous phase and at least one emulsifier, where the water / hydrocarbon ration is between 5/95 and 35/65 by weight and where the aqueous phase is dispersed in the hydrocarbon phase which comprises 5 to 35% by weight of C₈-C₂₂ normal paraffins. Again, it is Applicants' position that the Examiner fails to make a *prima facie* case of obviousness because no evidence had been presented that a person of ordinary skill in the art would have been motivated to modify or combine the teachings of Berlowitz and Haupais. Berlowitz has been discussed above. Haupais relates to a fuel which is a water-in-hydrocarbon emulsion comprising at least one emulsifying agent, at least one fatty acid ester and at least one polyalkoxylated alkylphenol. The emulsion comprises at least 5% of weight of water. An esterified or non esterified vegetable or animal oil can be incorporated in the composition (See column 8). According to the present invention, the fraction rich in normal paraffins comprises at least one animal and vegetable oil which is hydrotreated and therefore which is formed of paraffinic chains. This is far different from an esterified or non esterified vegetable or animal oil as explained above. Haupais does not describe nor suggest the use of hydrotreated animal and vegetable oils. Instead, the Examiner simply picks and chooses references to attempt to make up for the deficiencies of Berlowitz. To do so is improper hindsight and insufficient to sustain an obviousness rejection. It is not enough that the additives taught by Haupais are known. There is no suggestion or motivation to combine Berlowitz's emulsifying agent and Haupais' additives to arrive at the claimed invention. Therefore, it is Applicant's position the Examiner's obviousness rejection is improper. Applicants respectfully request that the rejection on this basis be withdrawn.

Applicants submit that the present application is now in condition for allowance.

Reconsideration and favorable action are earnestly requested.

RESPECTFULLY SUBMITTED,					
NAME AND REG. NUMBER	Leigh Z. Callander, Registration No. 55,035				
SIGNATURE			DATE	August 3, 2006	
ADDRESS	Rothwell, Figg, Ernst & Manbeck 1425 K Street, N.W., Suite 800				
CITY	Washington	State	D.C.	Zip Code	20005
COUNTRY	U.S.A.	Telephone	202-783-6040	Fax	202-783-6031

2937-124.AMD1